Applicant: Nobuo Imamura et al. Attorney's Docket No.: 15682-017US1 / OSP-19442

Serial No.: 10/566,921 Filed: January 31, 2006

Page : 3 of 10

Amendments to the Claims:

This listing of claims replaces all prior versions and listings of claims in the application:

Listing of Claims:

(Currently Amended) A chip removal method that removes for removing residue such as
chips that have remained in and adhered to an interior of a bag-shaped machined hole in a work
piece, the method comprising: wherein

providing an air blow nozzle with a spiral flow creating portion in a distal end portion thereof, wherein the spiral flow creating portion has a plurality of guide pieces that are twisted into a screw shape to change air flow therein into a spiral flow; and

directing air that is jetted out of the nozzle against a bottom portion of the machined hole, wherein the after air [[is]] jetted out and blown directed against [[a]] the bottom portion of the machined hole by using an air blow nozzle to change a flow of air that is circulating inside a nozzle into a spiral flow that moves in a direction towards the bottom portion of the machined hole, this spiral flow blows upward[[s]] like a tornado from a vicinity of the bottom portion of the machined hole in a direction toward[[s]] an aperture portion of the machined hole so that the residue inside the machined hole is uplifted by the spiral flow and removed.

- (Currently Amended) A chip removal air blow nozzle that removes arranged to remove
 residue such as chips that have remained in and adhered to an interior of a bag-shaped machined
 hole in a work piece comprising:
 - a nozzle distal end portion that is adapted to be inserted into the machined hole; and
- a spiral flow creating portion that is provided in the nozzle distal end portion and changes a flow of air that is eireulating flowing inside the nozzle into a spiral flow,

Applicant: Nobuo Imamura et al. Attorney's Docket No.: 15682-017US1 / OSP-19442

Serial No.: 10/566,921 Filed: January 31, 2006

Page : 4 of 10

wherein the spiral flow creating section has a plurality of guide pieces that are formed at the distal end portion of the nozzle and are twisted into a screw shape.

- (Canceled).
- 4. (Currently Amended) The chip removal air blow nozzle according to claim 2 <u>arranged so that</u>, wherein, when the machined hole is a female threaded hole; the spiral flow turns in a direction in which [[the]] <u>a</u> thread of the machined hole is loosened.
- 5. (New) The chip removal air blow nozzle according to claim 2 arranged so that when air is being blown from the air blow nozzle into the machined hole, a solenoid valve for an air supply hose that is connected to an air supply source is operable to be intermittently opened and closed.
- 6. (New) The chip removal air blow nozzle according to claim 2, wherein the plurality of guide pieces comprises three notch portions, wherein the three notch portions are formed at 120° intervals in the nozzle distal end portion, wherein the three notch portions are inclined at an angle which is between 30° and 45° relative to an axial direction of the air blow nozzle, and wherein the three notch portions have lengths in a range of 4 millimeters to 6 millimeters from the nozzle distal end portion.